

#### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

SDS ID: 31572

Issue date: 3/18/2024 Version: 1.0

#### **SECTION 1: Identification**

#### 1 1 Identification

Product form : Mixture

Product name : Mighty Brightline Debugger

#### 1.2. Recommended use and restrictions on use

No additional information available

#### 1.3. Supplier

Mighty Auto Parts 650 Engineering Drive Peachtree Corners, GA 30092 USA T 800-829-3900

## 1.4. Emergency telephone number

Emergency number : 1-800-424-9300 (CHEMTREC)

#### SECTION 2: Hazard(s) identification

#### 2.1. Classification of the substance or mixture

#### **GHS US classification**

Skin corrosion/irritation Category 1 H314 Causes severe skin burns and eye damage

Serious eye damage/eye irritation Category 1 H318 Causes serious eye damage

Specific target organ toxicity (repeated exposure) Category 2 H373 May cause damage to organs through prolonged or repeated

exposure

Full text of H statements : see section 16

#### 2.2. GHS Label elements, including precautionary statements

#### **GHS US labeling**

Hazard pictograms (GHS US)





Signal word (GHS US) : Danger

Hazard statements (GHS US) : H314 - Causes severe skin burns and eye damage

H318 - Causes serious eye damage

H373 - May cause damage to organs through prolonged or repeated exposure

Precautionary statements (GHS US) : P260 - Do not breathe dust/fume/gas/mist/vapors/spray.

P264 - Wash hands, forearms and face thoroughly after handling.

P280 - Wear protective gloves/protective clothing/eye protection/face protection.

P301+P330+P331 - If swallowed: rinse mouth. Do NOT induce vomiting.

P303+P361+P353 - If on skin (or hair): Take off immediately all contaminated clothing. Rinse

skin with water/shower.

P304+P340 - If inhaled: Remove person to fresh air and keep comfortable for breathing. P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove

contact lenses, if present and easy to do. Continue rinsing.

P310 - Immediately call a poison center or doctor.

#### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

P314 - Get medical advice/attention if you feel unwell.

P321 - Specific treatment (see supplemental first aid instruction on this label).

P363 - Wash contaminated clothing before reuse.

P405 - Store locked up.

P501 - Dispose of contents/container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation.

#### 2.3. Other hazards which do not result in classification

No additional information available

#### 2.4. Unknown acute toxicity (GHS US)

No additional information available

#### **SECTION 3: Composition/Information on ingredients**

#### 3.1. Substances

Not applicable

#### 3.2. Mixtures

Name	Product identifier	%	GHS US classification
2-BUTOXYETHANOL	CAS-No.: 111-76-2	10 – 15	Acute Tox. 4 (Oral), H302 Acute Tox. 4 (Inhalation), H332 Skin Irrit. 2, H315 Eye Irrit. 2, H319
SODIUM METASILICATE	CAS-No.: 6834-92-0	5 – 10	Skin Corr. 1A, H314 Eye Dam. 1, H318 STOT SE 3, H335
MONOETHANOLAMINE	CAS-No.: 141-43-5	1 – 5	Flam. Liq. 4, H227 Acute Tox. 4 (Oral), H302 Acute Tox. 3 (Dermal), H311 Skin Corr. 1, H314 Eye Dam. 1, H318 STOT SE 3, H335 STOT RE 2, H373
AMINES, C10-16-ALKYLDIMETHYL, N-OXIDES AND/OR LAURYLAMINE OXIDE	CAS-No.: 70592-80-2 / 1643-20-5	1 – 5	Skin Irrit. 2, H315 Eye Dam. 1, H318
ETHYLENEDIAMINE-N,N,N',N'-TETRAACETIC ACID TETRASODIUM SALT	CAS-No.: 64-02-8	1 – 5	Acute Tox. 4 (Inhalation), H332 Skin Irrit. 2, H315 Eye Dam. 1, H318 STOT RE 2, H373

<sup>\*</sup>Chemical name, CAS number and/or exact concentration have been withheld as a trade secret

Full text of hazard classes and H-statements : see section 16

#### **SECTION 4: First-aid measures**

#### 4.1. Description of first aid measures

First-aid measures general

: First aider: Pay attention to self-protection. Call a physician immediately.

First-aid measures after inhalation

: Remove person to fresh air and keep comfortable for breathing. Seek medical attention if ill

effect or irritation develops.

#### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

First-aid measures after skin contact : Seek medical attention if ill effect or irritation develops. Rinse skin with water/shower.

Remove/Take off immediately all contaminated clothing. Call a physician immediately.

First-aid measures after eye contact : Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to

do. Continue rinsing. Call a physician immediately.

First-aid measures after ingestion : If you feel unwell, seek medical advice. Rinse mouth. Do not induce vomiting. Call a physician

immediately.

#### 4.2. Most important symptoms and effects (acute and delayed)

Symptoms/effects : Not expected to present a significant hazard under anticipated conditions of normal use.

Symptoms/effects after inhalation : Although no appropriate human or animal health effects data are known to exist, this material is

expected to be an inhalation hazard.

Symptoms/effects after skin contact : Burns.

Symptoms/effects after eye contact : Serious damage to eyes.

Symptoms/effects after ingestion : Burns.

#### 4.3. Immediate medical attention and special treatment, if necessary

Treat symptomatically.

#### **SECTION 5: Fire-fighting measures**

#### 5.1. Suitable (and unsuitable) extinguishing media

Suitable extinguishing media : Dry chemical powder, alcohol-resistant foam, carbon dioxide (CO2). Water spray. Dry powder.

Foam. Carbon dioxide.

Unsuitable extinguishing media : Do not use a heavy water stream.

#### 5.2. Specific hazards arising from the chemical

Fire hazard : vapors may cause fire/explosion if source of ignition is present. Watch out for invisible flames.

The vapors are denser than air and may travel along the ground. Distance ignition possible.

Explosion hazard : No direct explosion hazard.

Hazardous decomposition products in case of fire : Toxic fumes may be released.

#### 5.3. Special protective equipment and precautions for fire-fighters

Firefighting instructions : Evacuate area. Use water spray or fog for cooling exposed containers. Do not allow water to

enter the vessels, a violent reaction may occur. Eliminate all ignition sources if safe to do so. Fight fire from safe distance and protected location. In case of fire: Stop leak if safe to do so. Do

not enter fire area without proper protective equipment, including respiratory protection.

: Do not enter fire area without proper protective equipment, including respiratory protection. Do

not attempt to take action without suitable protective equipment. Self-contained breathing

apparatus. Complete protective clothing.

Other information : High temperature decomposition products are harmful by inhalation. On exposure to high

temperature, may decompose, releasing toxic gases.

#### **SECTION 6: Accidental release measures**

#### 6.1. Personal precautions, protective equipment and emergency procedures

General measures : Clean up any spills as soon as possible, using an absorbent material to collect it. Prevent from

entering sewers, basements and workpits, or any place where its accumulation can be dangerous. Eliminate every possible source of ignition. Evacuate area. Stop leak if safe to do so. Notify authorities if product enters sewers or public waters. Absorb spillage to prevent material-

damage.

6.1.1. For non-emergency personnel

Protection during firefighting

Protective equipment : Avoid contact with skin, eyes and clothing. Wear recommended personal protective equipment.

3/18/2024 (Issue date) US - en 3/14

#### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

Emergency procedures : Ventilate spillage area. Evacuate unnecessary personnel. Do not breathe vapors. No open

flames, no sparks, and no smoking. Do not breathe dust/fume/gas/mist/vapors/spray. Avoid

contact with skin and eyes.

6.1.2. For emergency responders

Protective equipment : Do not attempt to take action without suitable protective equipment. Wear recommended

personal protective equipment. For further information refer to section 8: "Exposure

controls/personal protection".

Emergency procedures : Prevent from entering sewers, basements and workpits, or any place where its accumulation can

be dangerous. Evacuate unnecessary personnel. Stop leak if safe to do so.

#### 6.2. Environmental precautions

Avoid release to the environment. Do not allow to enter drains or water courses. Notify authorities if product enters sewers or public waters.

#### 6.3. Methods and material for containment and cleaning up

For containment : Collect spillage. Contain any spills with dikes or absorbents to prevent migration and entry into

sewers or streams. Stop leak, if possible without risk.

Methods for cleaning up : Take up liquid spill into absorbent material. Soak up with inert absorbent material (for example sand, sawdust, a universal binder, silica gel). Take up mechanically (sweeping, shoveling) and

collect in suitable container for disposal. This material and its container must be disposed of in a

safe way, and as per local legislation. Clear up rapidly by scoop or vacuum.

Other information : Dispose of materials or solid residues at an authorized site.

#### 6.4. Reference to other sections

For further information refer to section 8: "Exposure controls/personal protection". For further information refer to section 13.

#### **SECTION 7: Handling and storage**

#### 7.1. Precautions for safe handling

Additional hazards when processed : Not expected to present a significant hazard under anticipated conditions of normal use.

Precautions for safe handling : Ensure good ventilation of the work station. Do not breathe vapors. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Do not breathe

dust/fume/gas/mist/vapors/spray. Avoid contact with skin and eyes. Wear personal protective

equipment.

Handling temperature : ≤ 140 °F

Hygiene measures : Wear personal protective equipment. Take off immediately all contaminated clothing and wash it

before reuse. Separate working clothes from town clothes. Launder separately. Wash

contaminated clothing before reuse. Do not eat, drink or smoke when using this product. Always

wash hands after handling the product.

#### 7.2. Conditions for safe storage, including any incompatibilities

Technical measures : Keep in a cool, well-ventilated place away from heat.

Storage conditions : Store in corrosive resistant container with a resistant inner liner. Keep only in original container.

Store in a well-ventilated place. Keep container tightly closed. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Store locked up.

Incompatible materials : Metal

Packaging materials : Store always product in container of same material as original container.

#### **SECTION 8: Exposure controls/personal protection**

#### 8.1. Control parameters

3/18/2024 (Issue date) US - en 4/14

# Safety Data Sheet

Mighty Brightline Debugger		
USA - ACGIH - Occupational Exposure Limits		
ACGIH OEL TWA	5 mg/m³ Contains highly refined petroleum oil	
USA - OSHA - Occupational Exposure Limits		
OSHA PEL TWA	5 mg/m³ Contains highly refined petroleum oil	
OSHA PEL STEL	10 mg/m³ Contains highly refined petroleum oil	
ETHYLENEDIAMINE-N,N,N',N'-TETRAACETIC	ACID TETRASODIUM SALT (64-02-8)	
USA - ACGIH - Occupational Exposure Limits		
ACGIH OEL TWA	2 mg/m³	
MONOETHANOLAMINE (141-43-5)		
USA - ACGIH - Occupational Exposure Limits		
Local name	Ethanolamine	
ACGIH OEL TWA	3 ppm	
ACGIH OEL STEL	6 ppm	
Remark (ACGIH)	TLV® Basis: Eye & skin irr	
Regulatory reference	ACGIH 2023	
USA - OSHA - Occupational Exposure Limits		
Local name	Ethanolamine	
OSHA PEL TWA	6 mg/m³	
	3 ppm	
Regulatory reference (US-OSHA)	OSHA Annotated Table Z-1	
2-BUTOXYETHANOL (111-76-2)		
USA - ACGIH - Occupational Exposure Limits		
Local name	2-Butoxyethanol (EGBE)	
ACGIH OEL TWA	20 ppm	
Remark (ACGIH)	TLV® Basis: Eye & URT irr. Notations: A3 (Confirmed Animal Carcinogen with Unknown Relevance to Humans); BEI	
Regulatory reference	ACGIH 2023	
USA - ACGIH - Biological Exposure Indices		
Local name	2- BUTOXYETHANOL	
BEI (BLV)	200 mg/g Kreatinin Parameter: Butoxyacetic acid (BAA) (with hydrolysis) - Medium: urine - Sampling time: End of shift	
Regulatory reference	ACGIH 2023	
USA - OSHA - Occupational Exposure Limits		
Local name	2-Butoxyethanol	
OSHA PEL TWA	240 mg/m³	
	50 ppm	

#### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

2-BUTOXYETHANOL (111-76-2)	
Regulatory reference (US-OSHA)	OSHA Annotated Table Z-1

#### 8.2. Appropriate engineering controls

Appropriate engineering controls : Emergency eye wash fountains and safety showers should be available in the immediate vicinity

of any potential exposure. Ensure good ventilation of the work station.

Environmental exposure controls : Avoid release to the environment.

#### 8.3. Individual protection measures/Personal protective equipment

#### Personal protective equipment:

Wear recommended personal protective equipment.

Hand protection:

Protective gloves

Eye protection:

Chemical goggles or safety glasses. Safety glasses

#### Skin and body protection:

Wear suitable protective clothing

#### Respiratory protection:

In case of insufficient ventilation, wear suitable respiratory equipment

#### Personal protective equipment symbol(s):







#### **SECTION 9: Physical and chemical properties**

#### 9.1. Information on basic physical and chemical properties

Physical state : Liquid
Color : dark green
Odor : mild

Odor threshold : No data available

pH : 13

Melting point : Not applicable Freezing point : No data available

Boiling point :  $100 \, ^{\circ}\text{C}$ Flash point :  $> 100 \, ^{\circ}\text{C}$ 

: No data available Relative evaporation rate (butyl acetate=1) Flammability (solid, gas) : Not applicable. Vapor pressure : No data available Relative vapor density at 20°C : No data available Relative density : 0.95 (≥ 1.05) at 15.6°C Solubility : No data available Partition coefficient n-octanol/water (Log Pow) : No data available No data available Auto-ignition temperature Decomposition temperature No data available Viscosity, kinematic : No data available

#### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

Viscosity, dynamic : No data available
Explosion limits : No data available
Explosive properties : No data available
Oxidizing properties : No data available

#### 9.2. Other information

No additional information available

#### **SECTION 10: Stability and reactivity**

#### 10.1. Reactivity

The product is non-reactive under normal conditions of use, storage and transport.

#### 10.2. Chemical stability

Stable under normal conditions.

#### 10.3. Possibility of hazardous reactions

None under normal use.

#### 10.4. Conditions to avoid

High temperature.

#### 10.5. Incompatible materials

metals. Acids. Oxidizing agent.

#### 10.6. Hazardous decomposition products

fume. Carbon dioxide. Carbon monoxide.

#### **SECTION 11: Toxicological information**

#### 11.1. Information on toxicological effects

Acute toxicity (oral) : Not classified Acute toxicity (dermal) : Not classified Acute toxicity (inhalation) : Not classified

# ETHYLENEDIAMINE-N,N,N',N'-TETRAACETIC ACID TETRASODIUM SALT (64-02-8) ATE US (gases) 4500 ppmV/4h ATE US (vapors) 11 mg/l/4h ATE US (dust, mist) 1.5 mg/l/4h

SODIUM METASILICATE (6834-92-0)	
LD50 dermal rat	> 5000 mg/kg body weight (EPA OPPTS 870.1200: Acute Dermal Toxicity, 24 h, Rat, Male / female, Experimental value, Dermal, 14 day(s))
LC50 Inhalation - Rat	> 2.06 mg/l (EPA OPPTS 870.1300: Acute Inhalation Toxicity, 4 h, Rat, Male / female, Experimental value, Inhalation (vapours), 14 day(s))
ATE US (oral)	1152 mg/kg body weight

MONOETHANOLAMINE (141-43-5)	
LD50 dermal rabbit	1018 mg/kg (24 h, Rabbit, Inconclusive, insufficient data, Dermal)

# Safety Data Sheet

	Generation Reproduction Toxicity Study), Guideline: other:, Guideline: EPA OPPTS 870.3800
NOAEL (animal/male, F0/P)	1000 mg/kg body weight Animal: rat, Animal sex: male, Guideline: OECD Guideline 416 (Two-
MONOETHANOLAMINE (141-43-5)	
Reproductive toxicity :	Not classified
IARC group	3 - Not classifiable
2-BUTOXYETHANOL (111-76-2)	
Carcinogenicity :	Not classified
Germ cell mutagenicity :	Not classified
Respiratory or skin sensitization :	Not classified
pH	12 (25 %)
MONOETHANOLAMINE (141-43-5)	
рН	12.5 (1 %)
SODIUM METASILICATE (6834-92-0)	
рН	11 (1 %)
ETHYLENEDIAMINE-N,N,N',N'-TETRAACETIC	C ACID TETRASODIUM SALT (64-02-8)
	pH: 13
<u>'</u>	Causes serious eye damage.
pH	12 (25 %)
MONOETHANOLAMINE (141-43-5)	
рН	12.5 (1 %)
SODIUM METASILICATE (6834-92-0)	
рН	11 (1 %)
ETHYLENEDIAMINE-N,N,N',N'-TETRAACETIC	C ACID TETRASODIUM SALT (64-02-8)
	pH: 13
	Causes severe skin burns.
ATE US (dust, mist)	1.5 mg/l/4h
ATE US (vapors)	11 mg/l/4h
ATE US (gases)	4500 ppmV/4h
ATE US (oral)	1414 mg/kg body weight
LD50 dermal rat	> 2000 mg/kg Source: ECHA
LD50 oral	1414 mg/kg body weight Animal: guinea pig, Guideline: OECD Guideline 401 (Acute Oral Toxicity), 95% CL: 1020 - 1961
2-BUTOXYETHANOL (111-76-2)	
ATE US (dermal)	300 mg/kg body weight
ATE US (oral)	500 mg/kg body weight
LC50 Inhalation - Rat (Vapours)	> 1487 mg/l Source: ECHA
MONOETHANOLAMINE (141-43-5)	

### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

MONOETHANOLAMINE (141-43-5)			
NOAEL (animal/female, F0/P)	300 mg/kg body weight Animal: rat, Animal sex: female, Guideline: OECD Guideline 416 Generation Reproduction Toxicity Study), Guideline: other:, Guideline: EPA OPPTS 870. (Reproduction and Fertility Effects)		
STOT-single exposure	: Not classified		
SODIUM METASILICATE (6834-92-0)			
STOT-single exposure	May cause respiratory irritation.		
MONOETHANOLAMINE (141-43-5)			
STOT-single exposure	May cause respiratory irritation.		
STOT-repeated exposure	: May cause damage to organs through prolonged or repeated exposure.		
ETHYLENEDIAMINE-N,N,N',N'-TETRAACE	TIC ACID TETRASODIUM SALT (64-02-8)		
LOAEC (inhalation, rat, dust/mist/fume, 90 days)	0.015 mg/l air Animal: rat, Animal sex: female, Guideline: OECD Guideline 413 (Subchronic Inhalation Toxicity: 90-Day Study)		
NOAEL (oral,rat,90 days)	≥ 500 mg/kg body weight Animal: rat, Animal sex: male		
STOT-repeated exposure	May cause damage to organs through prolonged or repeated exposure.		
SODIUM METASILICATE (6834-92-0)			
NOAEL (oral,rat,90 days)	227 – 237 mg/kg body weight Animal: rat, Guideline: OECD Guideline 408 (Repeated Dose 9 Day Oral Toxicity Study in Rodents)		
MONOETHANOLAMINE (141-43-5)			
NOAEL (oral,rat,90 days)	300 mg/kg body weight Animal: rat, Guideline: other:, Guideline: other:		
NOAEC (inhalation,rat,dust/mist/fume,90 days)	0.01 mg/l air Animal: rat, Guideline: OECD Guideline 412 (Subacute Inhalation Toxicity: 28-Day Study), Guideline: EU Method B.8 (Subacute Inhalation Toxicity: 28-Day Study)		
STOT-repeated exposure	May cause damage to organs through prolonged or repeated exposure.		
2-BUTOXYETHANOL (111-76-2)			
NOAEL (dermal,rat/rabbit,90 days)	> 150 mg/kg body weight Animal: rabbit, Guideline: OECD Guideline 411 (Subchronic Derma Toxicity: 90-Day Study)		
Aspiration hazard	: Not classified		
/iscosity, kinematic	: No data available		
MONOETHANOLAMINE (141-43-5)			
Viscosity, kinematic	23.5 mm²/s (20 °C, EN ISO 3104: Capillary viscometer)		
Symptoms/effects Symptoms/effects after inhalation	<ul> <li>: Not expected to present a significant hazard under anticipated conditions of normal use.</li> <li>: Although no appropriate human or animal health effects data are known to exist, this material expected to be an inhalation hazard.</li> </ul>		
Symptoms/effects after skin contact Symptoms/effects after eye contact	: Burns. : Serious damage to eyes.		
Symptoms/effects after eye contact  Symptoms/effects after ingestion	: Burns.		

## **SECTION 12: Ecological information**

#### 12.1. Toxicity

Ecology - general : Before neutralisation, the product may represent a danger to aquatic organisms.

3/18/2024 (Issue date) US - en 9/14

# Safety Data Sheet

Persistence and degradability

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations			
Mighty Brightline Debugger			
LC50 - Fish [1]	> 100 mg/l		
LC50 - Other aquatic organisms [1]	> 100 mg/l		
ETHYLENEDIAMINE-N,N,N',N'-TETRAACET	IC ACID TETRASODIUM SALT (64-02-8)		
LC50 - Fish [1]	121 mg/l (96 h, Lepomis macrochirus, Literature study, Soft water)		
EC50 - Crustacea [1]	625 mg/l (24 h, Daphnia magna, Literature study)		
EC50 72h - Algae [1]	100 mg/l Source: IUCLID		
LOEC (chronic)	50 mg/l Test organisms (species): Daphnia magna Duration: '21 d'		
NOEC (chronic)	25 mg/l Test organisms (species): Daphnia magna Duration: '21 d'		
NOEC chronic fish	≥ 25.7 mg/l Test organisms (species): Danio rerio (previous name: Brachydanio rerio) Duration: '35 d'		
SODIUM METASILICATE (6834-92-0)			
LC50 - Fish [1]	210 mg/l (ISO 7346-1, 96 h, Danio rerio, Semi-static system, Fresh water, Experimental value)		
EC50 - Crustacea [1]	1700 mg/l (EU Method C.2, 48 h, Daphnia magna, Static system, Fresh water, Experimental value, GLP)		
EC50 72h - Algae [1]	207 mg/l Test organisms (species): Desmodesmus subspicatus (previous name: Scenedesmus subspicatus)		
MONOETHANOLAMINE (141-43-5)			
LC50 - Fish [1]	150 mg/l (96 h, Salmo gairdneri, Fresh water)		
EC50 - Crustacea [1]	140 mg/l (24 h, Daphnia magna)		
EC50 72h - Algae [1]	35 mg/l (Algae)		
EC50 72h - Algae [2]	2.1 mg/l Test organisms (species): Raphidocelis subcapitata (previous names: Pseudokirchneriella subcapitata, Selenastrum capricornutum)		
ErC50 algae	2.1 mg/l Source: ECHA		
NOEC (chronic)	0.85 mg/l Test organisms (species): Daphnia magna Duration: '21 d'		
NOEC chronic fish	1.24 mg/l Test organisms (species): Oryzias latipes Duration: '41 d'		
2-BUTOXYETHANOL (111-76-2)			
LC50 - Fish [1]	1474 mg/l Source: ECHA		
EC50 - Crustacea [1]	1800 mg/l Source: ECHA		
EC50 72h - Algae [1]	911 mg/l Source: ECHA		
NOEC (chronic)	100 mg/l Test organisms (species): Daphnia magna Duration: '21 d'		
NOEC chronic fish	≥ 100 mg/l Test organisms (species): Oryzias latipes Duration: '14 d'		
12.2. Persistence and degradability			
Mighty Brightline Debugger			
Persistence and degradability	Not rapidly degradable		
ETHYLENEDIAMINE-N,N,N',N'-TETRAACET	TC ACID TETRASODIUM SALT (64-02-8)		
D	Nick and the bit of a model by its and a		

Not readily biodegradable in water.

# Safety Data Sheet

ETHYLENEDIAMINE-N,N,N',N'-TETRAACETIC	CACID TETRASODIUM SALT (64-02-8)
Biochemical oxygen demand (BOD)	< 0.002 g O <sub>2</sub> /g substance
Chemical oxygen demand (COD)	$0.54 - 0.58$ g $O_2$ /g substance
SODIUM METASILICATE (6834-92-0)	
Persistence and degradability	Biodegradability: not applicable.
Chemical oxygen demand (COD)	Not applicable
ThOD	Not applicable
BOD (% of ThOD)	Not applicable
MONOETHANOLAMINE (141-43-5)	
Persistence and degradability	Biodegradable in the soil,Readily biodegradable in water.
Biochemical oxygen demand (BOD)	0.8 g O <sub>2</sub> /g substance
Chemical oxygen demand (COD)	1.34 g O <sub>2</sub> /g substance
ThOD	2.49 g O <sub>2</sub> /g substance
BOD (% of ThOD)	0.32
2-BUTOXYETHANOL (111-76-2)	
Persistence and degradability	Not rapidly degradable
AMINES, C10-16-ALKYLDIMETHYL, N-OXIDE	S AND/OR LAURYLAMINE OXIDE (70592-80-2 / 1643-20-5)
Persistence and degradability	Not rapidly degradable
12.3. Bioaccumulative potential	
ETHYLENEDIAMINE-N,N,N',N'-TETRAACETIC	CACID TETRASODIUM SALT (64-02-8)
Partition coefficient n-octanol/water (Log Pow)	-2.6
Bioaccumulative potential	Not bioaccumulative.
SODIUM METASILICATE (6834-92-0)	
Partition coefficient n-octanol/water (Log Pow)	-5.65
Bioaccumulative potential	Bioaccumulation: not applicable.
MONOETHANOLAMINE (141-43-5)	
Partition coefficient n-octanol/water (Log Pow)	-1.91
Bioaccumulative potential	Not bioaccumulative.
2-BUTOXYETHANOL (111-76-2)	
Partition coefficient n-octanol/water (Log Pow)	0.81 Source: ECHA
12.4. Mobility in soil	
SODIUM METASILICATE (6834-92-0)	
Ecology - soil	No (test)data on mobility of the substance available.

#### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

MONOETHANOLAMINE (141-43-5)	
Surface tension	0.05 N/m
Ecology - soil	No (test)data on mobility of the substance available.

#### 12.5. Other adverse effects

No additional information available

#### **SECTION 13: Disposal considerations**

#### 13.1. Disposal methods

Regional waste regulation : Disposal must be done according to official regulations.

Waste treatment methods : Dispose of contents/container in accordance with licensed collector's sorting instructions.

Sewage disposal recommendations : Disposal must be done according to official regulations.

Product/Packaging disposal recommendations : Avoid release to the environment. Dispose in a safe manner in accordance with local/national

regulations. Disposal must be done according to official regulations.

Additional information : Clean up even minor leaks or spills if possible without unnecessary risk. Do not re-use empty

containers.

Ecological information : Avoid release to the environment.

#### **SECTION 14: Transport information**

In accordance with DOT

#### 14.1. UN number

DOT NA No : Not regulated

#### 14.2. UN proper shipping name

Proper Shipping Name (DOT) : Not regulated

#### 14.3. Transport hazard class(es)

DOT

Transport hazard class(es) (DOT) : Not regulated

#### 14.4. Packing group

Packing group (DOT) : Not regulated

#### 14.5. Environmental hazards

Other information : No supplementary information available.

#### 14.6. Special precautions for user

#### DOT

Not regulated

#### 14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Not applicable

#### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

#### **SECTION 15: Regulatory information**

#### 15.1. US Federal regulations

Commercial status of components according to the United States Environmental Protection Agency's Toxic Substances Control Act (TSCA):

Name	CAS-No.	Listing	Commercial status	Flags
ETHYLENEDIAMINE-N,N,N',N'-TETRAACETIC ACID TETRASODIUM SALT	64-02-8	Present	Active	
SODIUM METASILICATE	6834-92-0	Present	Active	
MONOETHANOLAMINE	141-43-5	Present	Active	
2-BUTOXYETHANOL	111-76-2	Not present	-	
AMINES, C10-16-ALKYLDIMETHYL, N-OXIDES AND/OR LAURYLAMINE OXIDE	70592-80-2 / 1643-20-5	Not present	-	

#### 15.2. International regulations

#### **CANADA**

#### ETHYLENEDIAMINE-N,N,N',N'-TETRAACETIC ACID TETRASODIUM SALT (64-02-8)

Listed on the Canadian DSL (Domestic Substances List)

#### **SODIUM METASILICATE (6834-92-0)**

Listed on the Canadian DSL (Domestic Substances List)

#### **MONOETHANOLAMINE (141-43-5)**

Listed on the Canadian DSL (Domestic Substances List)

#### **EU-Regulations**

No additional information available

#### **National regulations**

#### **MONOETHANOLAMINE (141-43-5)**

Listed on INSQ (Mexican National Inventory of Chemical Substances)

#### 15.3. US State regulations

No additional information available

#### **SECTION 16: Other information**

Full text of H-phrases	
H227	Combustible liquid
H302	Harmful if swallowed
H311	Toxic in contact with skin
H314	Causes severe skin burns and eye damage

#### Safety Data Sheet

According to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

Full text of H-phrases	
H315	Causes skin irritation
H318	Causes serious eye damage
H319	Causes serious eye irritation
H332	Harmful if inhaled
H335	May cause respiratory irritation
H373	May cause damage to organs through prolonged or repeated exposure

NFPA health hazard : 1 - Materials that, under emergency conditions, can cause significant

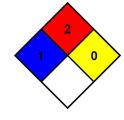
irritation.

NFPA fire hazard : 2 - Materials that must be moderately heated or exposed to relatively

high ambient temperatures before ignition can occur.

NFPA reactivity : 0 - Material that in themselves are normally stable, even under fire

conditions.



Hazard Rating

Health : 1 Slight Hazard - Irritation or minor reversible injury possible

Flammability : 1 Slight Hazard - Materials that must be preheated before ignition will occur. Includes liquids,

solids and semi solids having a flash point above 200 F. (Class IIIB)

Physical : 0 Minimal Hazard - Materials that are normally stable, even under fire conditions, and will NOT

react with water, polymerize, decompose, condense, or self-react. Non-Explosives.

Personal protection : B - Safety glasses, Gloves

Safety Data Sheet (SDS), USA

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.